

Date: Wednesday, 13/08/2008 9:51:09 AM
 User: Linda Lacelle

Process Sheet

Customer : CC-DAR01 Dart Aerospace Ltd.

Drawing Name : D407-667-205

Job Number : 41195

Estimate Number : 10804

P.O. Number :

Part Number : D407667205

This Issue : 13/08/2008 S.O. No. :

Drawing Number : ECN1225 - REWORK

Prsht Rev. : NC

Project Number :

First Issue : // Type : CROSSTUBES

Drawing Revision :

Previous Run : 41182

Material :

Due Date : 22/08/2008

Qty: 1 Um: Each

Written By :

Checked & Approved By :

Comment :

Additional Product

Job Number:

| | | | |
|--|--------------------|--|-----------|
| DART Dart Aerospace Ltd. 1270 ABERDEEN ST. HAWKESBURY ONT CANADA K6A 1K7 | | TC APPROVAL # 09-89 TEL: 1-613-632-5200 | |
| PN | D407-667-205 | CHG | CHG004 |
| DESC. | Crosstube Aft High | SIC | SH01-5 |
| LOT | B39363 | SIC | SR01304NY |
| MODEL | Bell 407 | SIC | |
| MADE IN CANADA | | 02729-0 | |

Seq. #: Machine Or Operation:

Description :

1.0 CROSSTUBES

CROSSTUBES RESOURCE 1

Comment: CROSSTUBES RESOURCE 1

PULL FROM STOCK:

1 X D407-667-205 B39363 CHG 004 ml 08 08 26 ①

2.0 D407667205

Crosstube Aft

Comment: Qty.: 1.0000 Each(s)/Unit Total : 1.0000 Each(s)

Crosstube Aft

ml 08 08 26 ①

3.0 CROSSTUBES

CROSSTUBES RESOURCE 1

Comment: CROSSTUBES RESOURCE 1

REWORK TUBE PER ECN1225

MOVE BOTH CHAFING SHIELDS 0.375"

TOWARD BL 0.0.

ml 08 08 27 ①

4.0 QC5

INSPECT WORK TO CURRENT STEP

Comment: INSPECT WORK TO CURRENT STEP

S 08/08/28 ②

5.0 QC4

INSPECT 100% KITS FOR COMPLETENESS

Comment: INSPECT FOR ORIGINAL KIT

TO BE INCLUDED

S 08/08/27 ②

Dart Aerospace Ltd

| W/O: | | WORK ORDER CHANGES | | | | | |
|------|------|--------------------|----|------|-----|-------------------------------------|--------------------------|
| DATE | STEP | PROCEDURE CHANGE | By | Date | Qty | Approval Chief Eng / Prod Mgr | Approval QC Inspector |
| | | | | | | | |
| | | | | | | | |

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

QA: N/C Closed: _____ Date: _____

| NCR: | | WORK ORDER NON-CONFORMANCE (NCR) | | | | | | |
|------|------|----------------------------------|-----------------------------|---------------------------------|----------------|---------------------------|-----------------------|--------------------------|
| DATE | STEP | Description of NC Section A | Corrective Action Section B | | | Verification Section C | Approval Chief Eng | Approval QC Inspector |
| | | | Initial Chief Eng | Action Description Chief Eng | Sign & Date | | | |
| | | | | | | | | |
| | | | | | | | | |
| | | | | | | | | |

NOTE: Date & initial all entries

Date: Wednesday, 13/08/2008 9:51:09 AM
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Job Number:



Seq. #:

Machine Or Operation:

Description :

6.0

PACKAGING 1

PACKAGING RESOURCE #1



Comment: PACKAGING RESOURCE #1
REPACKAGE USING NEW B/N
@ CHG 006
NEW LABELS REQUIRED

18 58188729 (X)

7.0

QC21

FINAL INSPECTION/W/O RELEASE



08/09/02 H

Comment: FINAL INSPECTION/W/O RELEASE

Job Completion



MF 08-08-29

Dart Aerospace Ltd

| W/O: | | WORK ORDER CHANGES | | | | | |
|------|------|--------------------|----|------|-----|-------------------------------------|--------------------------|
| DATE | STEP | PROCEDURE CHANGE | By | Date | Qty | Approval Chief Eng / Prod Mgr | Approval QC Inspector |
| | | | | | | | |
| | | | | | | | |

Part No: _____ PAR #: _____ Fault Category: _____ NCR: Yes No DQA: _____ Date: _____

QA: N/C Closed: _____ Date: _____

| NCR: | | WORK ORDER NON-CONFORMANCE (NCR) | | | | | | |
|------|------|----------------------------------|-----------------------------|---------------------------------|----------------|---------------------------|-----------------------|--------------------------|
| DATE | STEP | Description of NC Section A | Corrective Action Section B | | | Verification Section C | Approval Chief Eng | Approval QC Inspector |
| | | | Initial Chief Eng | Action Description Chief Eng | Sign & Date | | | |
| | | | | | | | | |
| | | | | | | | | |
| | | | | | | | | |

NOTE: Date & initial all entries

ENGINEERING CHANGE NOTICE

DART AEROSPACE LTD

| | | | | |
|--|----------|---|---------------------------------|-------------|
| Date: 08.07.17 | Job No.: | ADR Yes/No: <input checked="" type="checkbox"/> Y | ADR Date: 08.07.17 | ECN #: 1225 |
| Product No.: D407-667-245 | | Created By: <i>[Signature]</i> | Approved By: <i>[Signature]</i> | |
| Product Name: CROSSTUBE ASS'Y (407 HIGH AFT) | | Checked By: <i>[Signature]</i> | General Manager Approval: | |

| Distribution | Reqd | Resp | Received | Distribution | Reqd | Resp | Received |
|------------------------------|------|-------|----------|----------------------------|------|------|----------|
| Production Manager | Y | LL | | Customer Technical Support | Y | DS | |
| Production Engineering Coord | Y | EC/DD | | Marketing | N | | |
| Director Quality Assurance | N | | | | | | |
| Customer Order Processing | N | | | | | | |

Reason for Change:
REVISED SUPPORT LOCATION ON CROSSTUBE: MOVED EACH SUPPORT 3/8" TOWARD BL0.0 (CROSSTUBE'S CENTERLINE) PER CAR#08-21

Documents Affected:
RELEASE D407-667-245 REV. E

| # | Engineering Actions | Reqd | Resp | Notes | Complete |
|----|--|------|------|--|-----------------------------|
| 1 | Required Documents/Drawings Under Review | Y | CP | | <i>[Signature]</i> 08.03.17 |
| 2 | Update Blue/Pink/DSI Folder and Electronic Files | Y | KJ | | |
| 3 | Update D-Part/M-Drawing/DSI/DEO Master Binders | Y | KJ | | |
| 4 | Update Grey Project Binder | Y | KJ | ADR | |
| 5 | Move Electronic Files | Y | KJ | | |
| 6 | Update Master Document List (MDL) | Y | MB | | <i>[Signature]</i> 08.06.07 |
| 7 | Update Document Record (DR) | Y | KJ | | |
| 8 | Create/Update Change Record Form | Y | KJ | -205 NOW @ CHG 006 AND -205A @ CHG 004 | |
| 9 | Create/Update PPP's | Y | KJ | AS REQUIRED | |
| 10 | Update Controlled PDF Files | Y | KJ | | |
| 11 | Notify TC/FAA of Change | N | | | |
| 12 | Update QSI 021 and/or STC Approval List | N | | | |
| 13 | Update Product Development Summary | N | | | |
| 14 | Update Accpac Database | N | | | |
| 15 | Update Access (ARC) Database | N | | | |
| 16 | Update/Verify ARC | N | | | |
| 17 | Update Paperwork Kits in Production | Y | KJ | AS REQUIRED | |
| 18 | Update Qpulse/Laminated Dwgs | N | | | |
| 19 | Update Product Compatability Matrix | N | | | |
| 20 | Create Eurocopter Form (FEE) | N | | | |
| 21 | | | | | |

[Handwritten Signature]
4/1/05

| # | Production Actions | Reqd | Resp | Notes | Complete |
|----|--|------|-------|-------------------------|----------|
| 22 | Create/Update Coss IPP/BOM | Y | EC/DD | AS REQUIRED + SEE BELOW | |
| 23 | Update FAI Sheets | Y | EC/DD | AS REQUIRED + SEE BELOW | |
| 24 | Create/Update CNC Programs | N | | | |
| 25 | Create/Update Tooling | Y | EC/DD | AS REQUIRED + SEE BELOW | |
| 26 | Red Tag Stock (Specify) | Y | JM | PER CAR#08-21 | |
| 27 | Rework/Scrap Current Production and/or Stock | Y | LL | REWORK AS REQUIRED. | |
| 28 | Update Paperwork Kits in Stock | N | | | |
| 29 | Create/Update MPP | Y | EC/DD | AS REQUIRED | |
| 30 | | | | | |

| # | Quality Assurance Actions | Reqd | Resp | Notes | Complete |
|----|---------------------------|------|------|-------|----------|
| 31 | Notify Previous Customers | N | | | |
| 32 | Notify Eurocopter France | N | | | |
| 33 | | | | | |

Description / Action:
TAKE NOTE THAT THE DWG HAS CHANGED CONSIDERABLY TO REFLECT THE LATEST DART'S DWG STDS.
REVIEW ANY OF THE PRODUCTION'S DOCUMENTS REFERING TO SPECIFIC VIEWS OR CALLOUTS.
VERIFY NEW LOCATION OF SUPPORTS PRIOR REMOVING THE ABRASION STRIPS. RELOCATE ABRASION STRIPS ONLY IF NECESSARY.

AMENDMENT DESIGN REVIEW (ADR)Part/Installation No.: D407-667-245 Rev: E Design Review No.: _____ Date: 08.07.31Project Number: 00056 Project Description/Title: CROSSTUBEASSY (407 HIGH AFT)Eng. Project Manager: M. BELLAVANCE

| Persons Present | Title | Initial |
|-----------------|-----------------------------|-----------|
| MIKE PETSCH | Design Manager | <i>MP</i> |
| M. BELLAVANCE | Engineering Project Manager | <i>MB</i> |
| D. SHEPHERD | Chief Engineer (DE #02) | <i>DS</i> |
| | Manufacturing Manager | |
| | Quality Manager | |
| J. MURDOCH | Q.C. Inspector | <i>JM</i> |
| | | |

Comments

GENE LEBLANC, AIR LOGISTIC'S INSPECTOR, REPORTED THAT THE INNER MOST CLAMPS FASTENING THE CHAFFING SHIELDS INTERFERE WITH THE AIRCRAFT'S ROCKER BEAM MOUNTS (REF. PAR#08-21).

IT WAS DETERMINED THAT THIS INTERFERENCE CAN BE ELIMINATED BY MOVING BOTH CHAFFING SHIELDS 0.375" TOWARD BL 0.0.

THIS IS A MINOR DIMENSIONAL CHANGE AND APPROVAL BY DE#02 IS ACCEPTABLE.

41182
41195

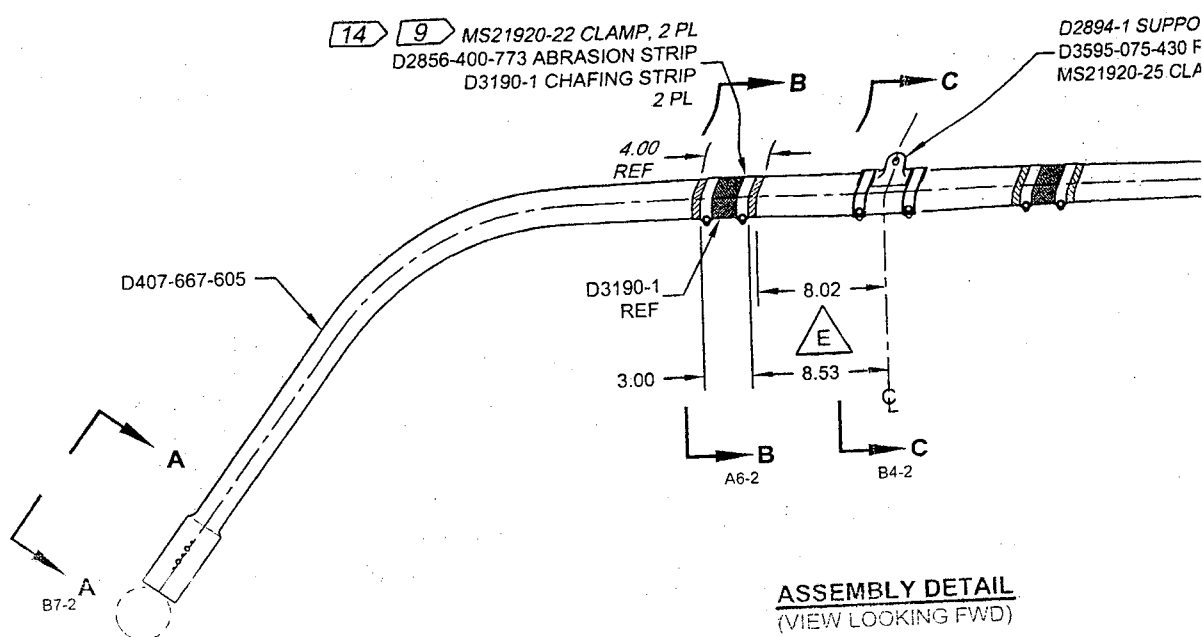
| Key Tasks (Check or N/A) | Check | Responsible | Completion Date |
|--|-------|-------------|-----------------|
| Review Outstanding TSR/NCR/CAR/PAR | Y | MP | |
| Fill out Criteria/Constraints Form – Inputs | N/A | | |
| Fill out Project Evaluation Form | N/A | | |
| D-Part creation/revision | Y | MB | |
| Get Manufacturing Input | N/A | | |
| First Article Inspection | N/A | | |
| Fit and Function Test | N/A | | |
| Structural Test | N/A | | |
| Reports (Compliance, Loads, Stress, Conformity, DSI) | N/A | | |
| Check Drawings against all QSIs | Y | MB | |
| Review Criteria/Constraints Form | N/A | | |
| Revision to existing approval | N/A | | |
| Close Amendment Project | Y | MB | |
| | | | |

Conclusion:

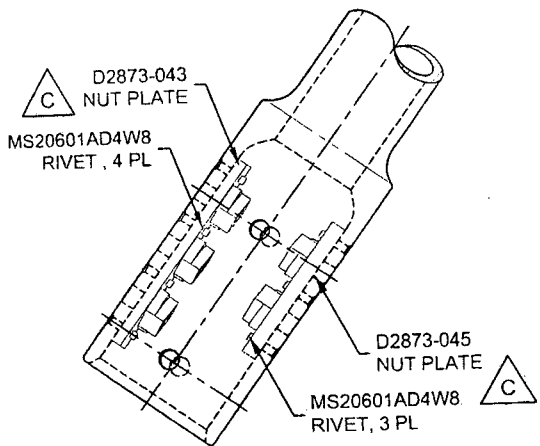
PROCEED WITH THE REVISION OF DRAWING D407-667-245 FROM REV. D TO REV. E AND RELEASE THROUGH ECN#1225.

RELEASED
08-08-11/11

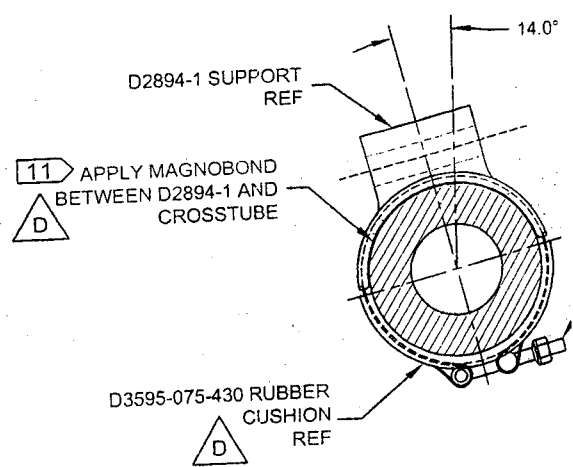
| | | | |
|------------|---|---|--------------|
| E | 8.02 AND 8.53 WERE 8.40 AND 8.90 (ZN D5-2); REORGANIZED VIEWS AND REFORMATED DRAWING TO CURRENT STANDARDS. REASONS: CLAMPS MOVED 0.375 TOWARD CL TO ELIMINATE INTERFERENCE WITH AIRCRAFT MOUNTS. REFERENCE: PAR#08-21 AND ECN#1225 | MB | 08.07.24 |
| D | ADD VIEW FOR OEM SKID HOLES, ROTATE ORIENTATION OF CLAMPS SECTION F-F, REMOVE -851 ABRASION STRIP, ADD MAGNOBOND 6398, ADD CUSHION | PH | 07.02.07 |
| C | ADD HOLES AND NUT PLATES FOR COMPATIBILITY WITH BHT/AA SKIDTUBES | PH | 05.07.26 |
| B | ADD CHAFING SHIELD | CP | 03.05.21 |
| A | NEW ISSUE | CP | 02.05.13 |
| REV. | DESCRIPTION | BY | DATE |
| DESIGN | | DART AEROSPACE LTD HAWKESBURY, ONTARIO, CANADA | |
| DRAWN | | | |
| CHECKED | | DRAWING NO. | REV. E |
| MFG. APPR. | | D407-667-245 | SHEET 1 OF 4 |
| APPROVED | | TITLE | SCALE |
| DE APPR. | | CROSSTUBE ASS'Y (407 HIGH AFT) | NTS |
| DATE | 08.07.24 | COPYRIGHT © 2002 BY DART AEROSPACE LTD THIS DOCUMENT IS PRIVATE AND CONFIDENTIAL AND IS SUPPLIED ON THE EXPRESS CONDITION THAT IT IS NOT TO BE USED FOR ANY PURPOSE OR COPIED OR COMMUNICATED TO ANY OTHER PERSON WITHOUT WRITTEN PERMISSION FROM DART AEROSPACE LTD | |



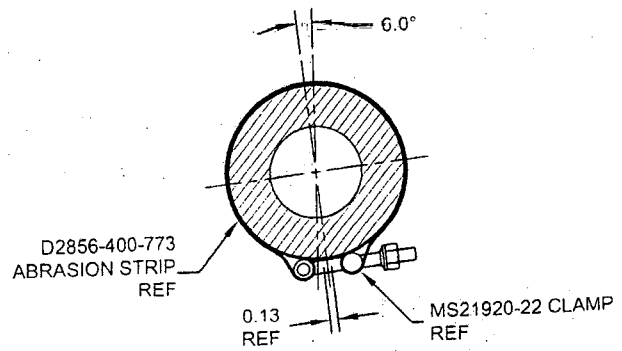
ASSEMBLY DETAIL
(VIEW LOOKING FWD)



VIEW A-A CUFF DETAIL
SCALE 4X

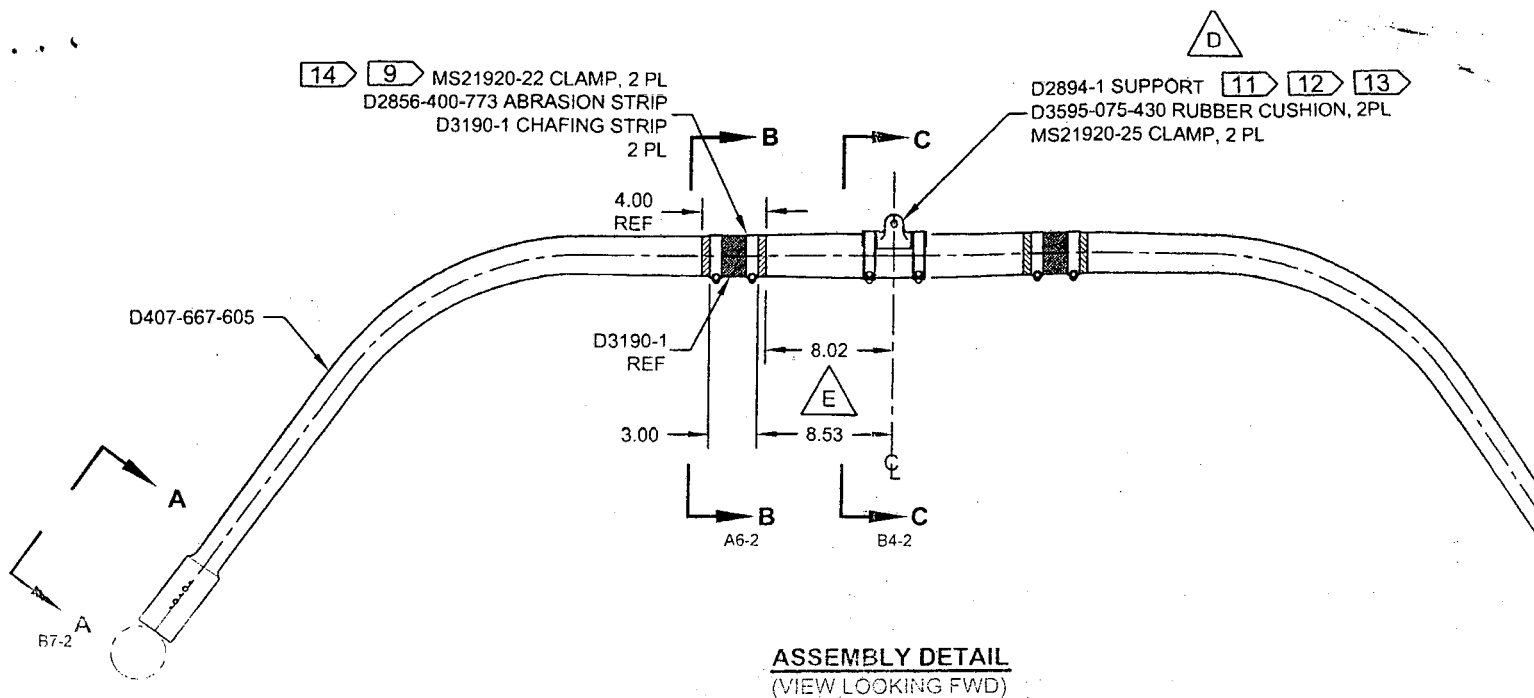


SECTION C-C
SCALE 4X

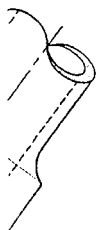


SECTION B-B
SCALE 4X, 2PL

FWD
←



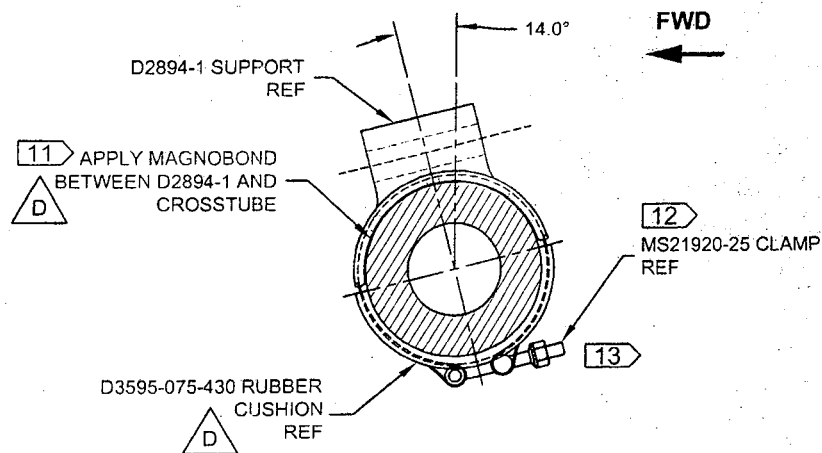
ASSEMBLY DETAIL
(VIEW LOOKING FWD)



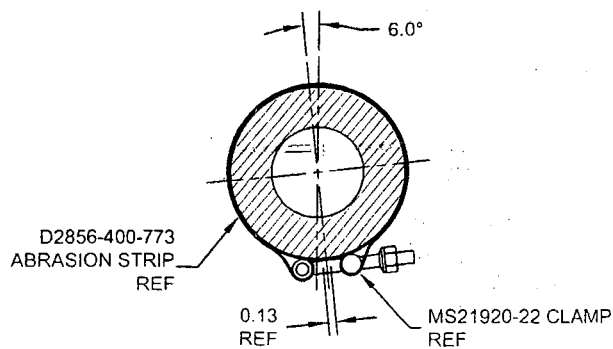
D2873-045
NUT PLATE
301AD4W8
3 PL

C

UFF DETAIL
LE 4X



SECTION C-C
SCALE 4X



FWD

SECTION B-B
SCALE 4X, 2PL

| |
|---------|
| DESIGN |
| DRAWN |
| CHECKE |
| MFG. AP |
| APPROV |
| DE APPF |
| DATE |

6

5

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3